

Telepresent Virtual Environments

The CAVE and Beyond : VR Art in Museums and Galleries

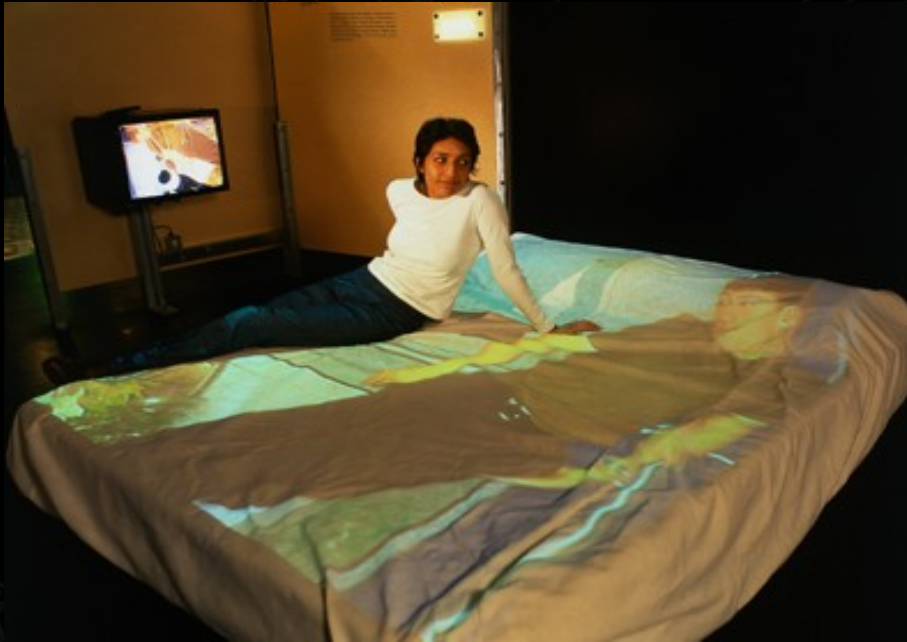
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A Background in Telepresent Installations

- **Telematic Dreaming -1992**
- **Telematic Vision - 1994**
- **The Tables Turned - 1997**
- **A Body of Water - 1999**
- **There's no Simulation like Home - 2000**

Telematic Dreaming -1992



Telematic Vision - 1994



The Tables Turned - 1997



A Body of Water - 1999



There's no Simulation like Home - 2000



Telepresent Prerequisites in Virtual Space

- Convincing movement in virtual space and time is measured against a fixed point of reference - the room/frame.
- Immersive virtual reality is dependent on an interface that combines both the real and virtual environment by creating a seamless transition between them.
- The walls, floor, ceiling and contents of a CAVE environment are equally as important as the virtual data projected onto them.

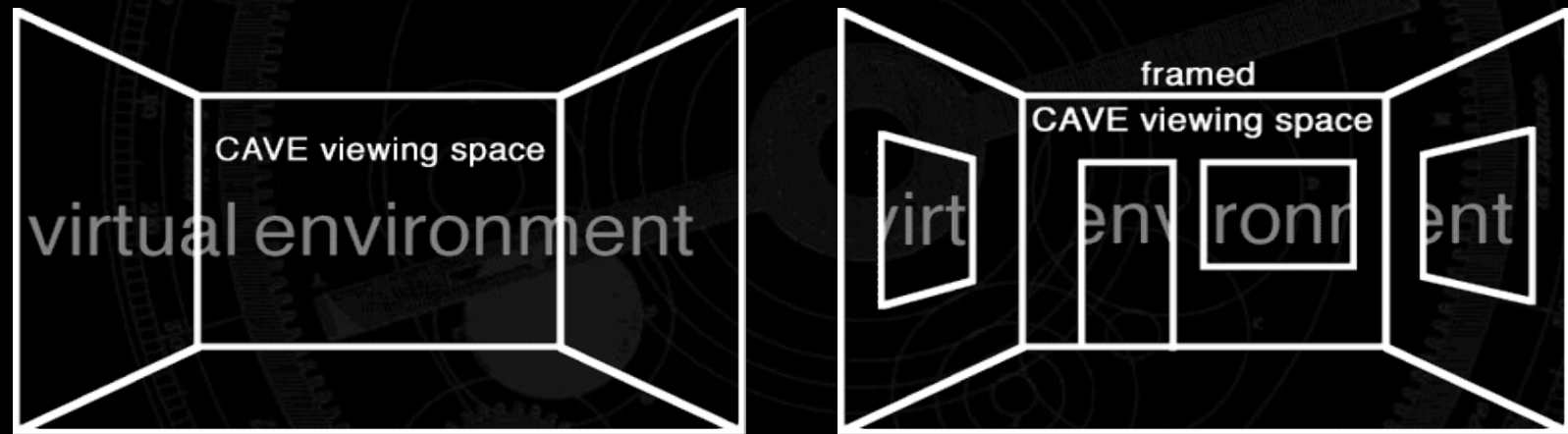
The New Citroen

By Roland Barthes 1957



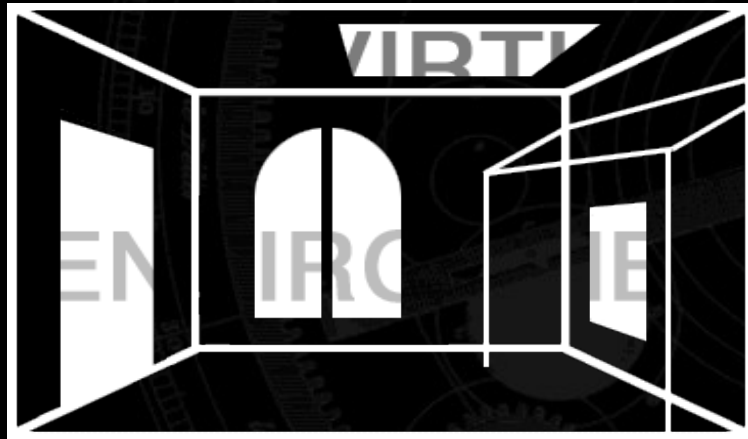
Convincing virtual reality requires a fixed point of reference,
such as the console of the 1957 Citroen D.S 19.

Utilising the Confines of the CAVE



The difference between existing within a 3 x 3 meter box and a virtual room is down to interface design.

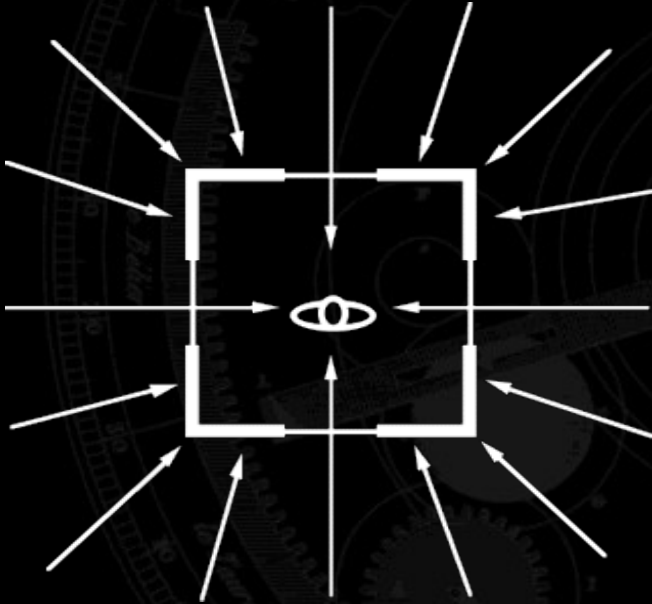
A Seamless Transition Between the Real and Virtual Environment



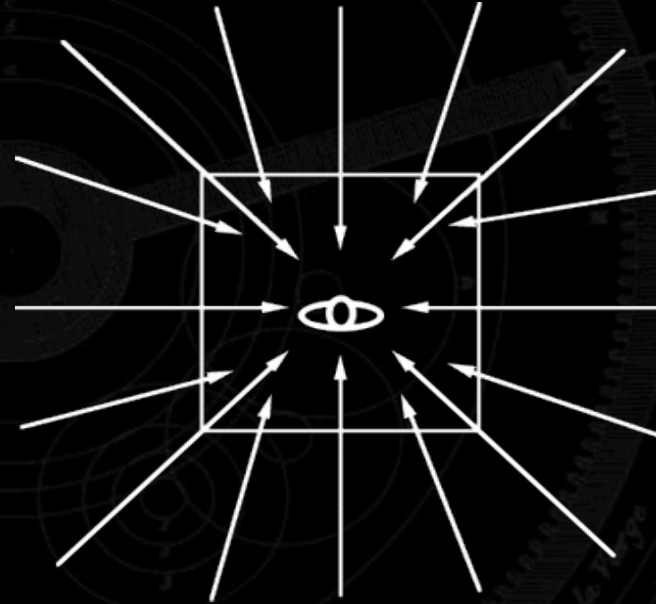
The construction of a physical room interface, functioning as a screen/window to the exterior virtual environment.

- Giving the CAVE environment or exhibit a particular theme.
- Cutting the cost of large format data projectors.
- Customising the CAVE projection architecture

User Movements in Immersive VR

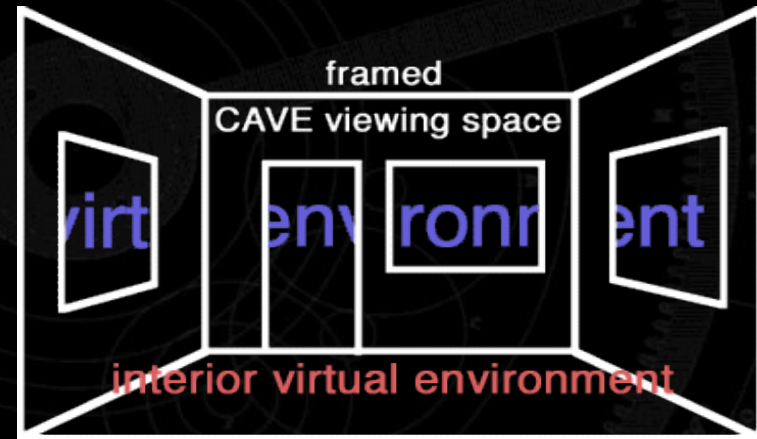
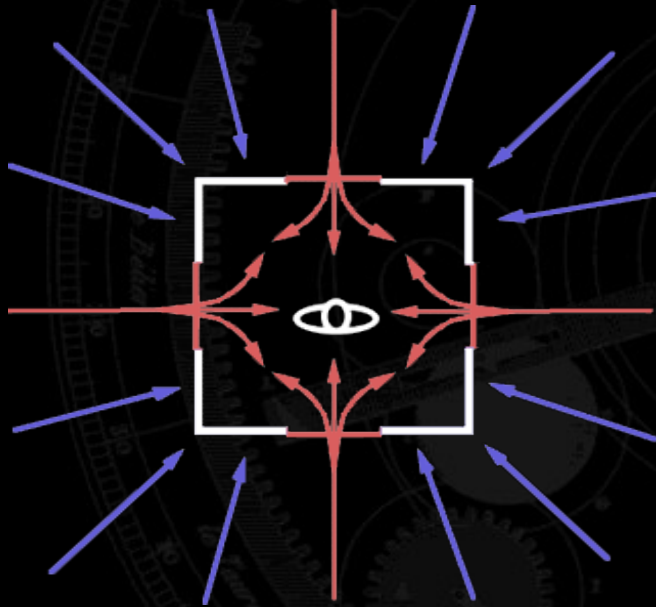


By limiting the view to framed areas, the user is forced to move around the CAVE to gain all points of view.



The conventional CAVE user is not encouraged to move within the space when the experience is constantly face on.

Virtual Room Environments



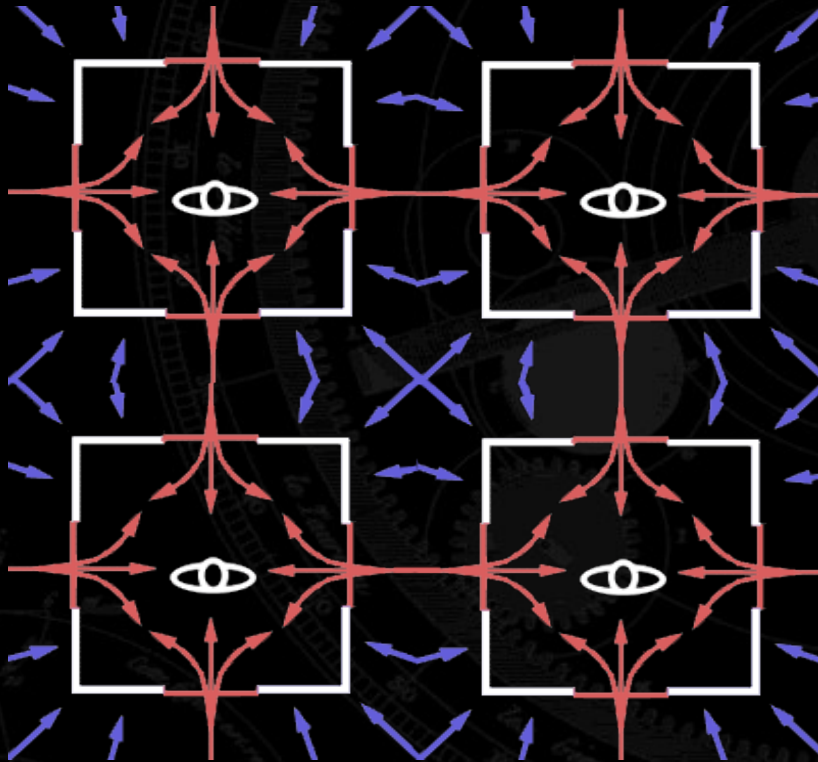
Virtual walls mapped onto the CAVE screen walls would allow virtual characters to exist both inside and outside the virtual

Navigating within a Virtual Room



- Navigating the CAVE like a mobile room/frame within a virtual environment.
- Movement in space and time is measured against a fixed object - the room/frame.

Shared Virtual Rooms



A group of connected CAVE environments would allow the user/s to interact and move between shared virtual rooms.



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